

## **Guidelines for SC School-Based Dental Prevention Programs**

Based on:

1994 Workshop on Guidelines for Sealant Use Recommendations

2001 Recommendations for Clinical Practice: Fissure Caries

Draft School Health Center Guidelines. AAP. 2001.

Bright Futures in Practice: Oral Health.

### **Introduction**

While the prevalence of dental caries has decreased dramatically over the last two decades, it still affects the majority of children. The amount and severity of caries occurs disproportionately in children from low income and minority families. Studies have shown that up to 85 percent of all decay occurs in the pits and fissures of teeth. The rest of the decay occurs on smooth surfaces. Dental sealants are proven by numerous studies to be effective preventive interventions for decay of the pits and fissures, their use by private dentists falls short of expectations. Topical fluorides are proven effective in fighting decay on smooth surfaces. These two interventions are the cornerstones for any dental prevention program.

These guidelines recognize the recent changes in caries epidemiology as mentioned in the Surgeon General's Year 2000 Report on Oral Health in America. The overall philosophy behind such guidelines is the same as in the 1994 Workshop on Guidelines for Sealant Use: Preface, "Themes of risk-based caries prevention and conservative methods for diagnosing and treating pit and fissure caries underlay all discussions."

### **Guiding Principles**

- Prevention of dental caries is better than treatment. Sound, non-diseased teeth are more highly valued than adequately restored teeth.
- The least invasive approach, using the simplest intervention for managing caries is preferred.
- Minimizing the cost of preventing or controlling decay is desirable.
- Strategies for prevention may differ between individual care and community programs.

### **Scope of Work**

School-based dental prevention programs should address the following areas:

1. Assess disease burden in the population served and school's needs.
  - Select population-targeting method (reduced and free lunch programs etc)
  - Target program based on risk of disease
  - Target school and participants according to economic need.
2. Deliver dental preventive services including oral hygiene instructions, oral prophylaxis, topical fluoride (gel or varnish), the application of dental sealants, and dental radiographs (if possible).
3. Increase education efforts for individual and community awareness of the importance of oral health and the benefits of dental sealants.
4. Referral to and follow up with community dentists for definitive restorative care.
  - Follow up with school nurse to evaluate number of referrals completed.
  - Follow up with local health department for compliance issues and outreach efforts.
5. Quality Assurance program including follow up.

### **I. Assess disease burden in the population served and school's needs**

#### **Needs Assessment**

Work with the school to conduct a needs and resources assessment before developing a health services plan. The assessment should take into account the number of students enrolled, their needs, resources available in school (including space, personnel, and financial resources), community resources, and parent expectations for the program, as well as state and local regulations and policies that might affect the program. School based health program staff should include a dentist and dental hygienist. The needs should be re-assessed periodically along with the effectiveness of the program through established evaluation and quality assurance processes.

Written policies and procedures for all aspects of the program should be developed and approved by the district health service coordinator and the DHEC Oral Health Division.

#### **Selection of Services**

Locally determine the selection of oral health services based on an assessment of community characteristics, needs, and services available. Design program to meet the specific needs of the community - Local solutions for local problems (target specific populations). Program should include services recommended in the Bright Futures in Oral Health guidelines.

Certain services are inherent in school based programs, dental assessment, treatment and/or referral, follow-up and case management. Schools may be the only place where students receive dental care. Inclusion of the community in planning and development of any school based dental program is necessary for success. The program's services should be integrated with the overall community public health and oral health systems.

#### Collaboration

Oral Health providers will collaborate with other health services staff and regular school personnel to assess and meet the health, developmental, and educational needs of the students. Dental providers will actively participate on school health teams to establish and maintain effective team relationships.

#### Health Assessment

A complete health assessment including oral health should be completed prior to entry into school.

The dental hygienist will work with the local school nurse or other school official to arrange dental screenings using the DHEC recognized survey instrument as needed.

Periodically the Oral Health Division will conduct state oral health surveys. Programs should coordinate such activities with the health assessments to prevent duplication of effort and minimize disruption for the school. The data from such screenings will be delivered to the Oral Health Division within 30 days. Results will be shared with the school officials.

## **II. Dental preventive services including oral hygiene instructions, oral prophylaxis, topical fluoride (gel or varnish), the application of dental sealants, and dental radiographs (if possible).**

#### Updated Health Information

School nurse or other school official will provide updated health information, including oral health information, at start of each school year and at any time a significant change occurs. Information will be collected from parents at least annually and should include known allergies, details of chronic health conditions, any medications, emergency contact information, and the name and phone number of the child's primary health care providers. This information must be available for review by health service professionals.

#### Cultural Sensitivity

All persons who provide oral health services to children shall do so in a caring, culturally sensitive, and respectful manner.

### Confidentiality

Program should develop written policies for sharing of health information with relevant school staff when necessary. Policy should be consistent with school's privacy policies.

Program must include the following phrase in the Consent For Treatment Forms signed by the parent or guardian:

"This information will be used to help better meet the needs of all children in our state. It will be used in reports to show how well the program is working, to identify any needs not being met and help staff with the administration of the program. This information will be shared, as required by law, with the Department of Health and Environmental Control's, Division of Oral Health, in report format."

### Standing Orders

All activities of the dental hygienists in school settings will be approved and authorized by a licensed dentist with review by a DHEC official before any activities begin. A sample of standing orders is included.

### Direct Services

Program should provide preventive care and assure access to restorative dental care. School based health personnel have an important role in education and screening of children to ensure that they receive the oral health care they need.

### Critical Scientific Facts Related to Sealant Use

- Sealants have been demonstrated to be a safe and effective long-term method to prevent pit and fissure caries (11-13).
- Pit and fissure caries attack begins in early childhood and continues through adolescence and into adulthood (14-16).
- In addition to preventing carious lesions, sealants can arrest caries progression (17-20).
- Effective sealant use requires meticulous application technique, particularly moisture control (7, 10). Sealant retention should be checked within one year of application (7).

### Dental Sealants

All patients that have teeth with structural characteristics that place them at risk for decay should be considered for preventive sealants. Patients that have teeth with questionable decay should also be considered for sealants (therapeutic sealants) (17-20). A third type of dental sealant, interim sealant, may be used in community and school based programs. These sealants are used to slow down the decay process in some teeth that have dentinal caries. Interim sealants are not recommended unless a dentist examines the patient and determines that the patient is unlikely to

**access restorative services in the near future and the size of the lesion is not too large to preclude the procedure.**

**According to the proceedings of the workshop on sealant guidelines, “The goal of preventing caries through widespread use of sealants will be accomplished best by providing preventive sealants to individuals at high risk and placing therapeutic sealants on carious lesions that are limited to enamel.”**

#### Topical Fluoride (varnish, gel, rinse)

As mentioned in the introduction, topical fluorides are proven effective in the prevention of smooth surface caries. The March, 2001 National Institutes of Health sponsored Consensus Conference on Dental Caries Prevention verified this effectiveness. The Conference noted in its report the proven effectiveness of fluoride varnishes in the prevention of caries in permanent dentition. A November 2001 CDC report on the use of fluoride in the prevention of dental caries recommends the use of fluoride varnish in a preventive program.

#### Written Protocols

The program should provide written protocols and procedures for common dental procedures. These should reflect the procedures indicated in the standing orders.

### **III. Increase education efforts for individual and community awareness of the importance of oral health and the benefits of dental sealants.**

#### Oral Health Education

Program should coordinate oral health education with the school's approved health curriculum. Education is a necessary component to prevention. Any program should support the oral health education curriculum taught in the school. Oral health program staff should advocate for the establishment and retention of oral health education in the school's overall curriculum (link to math, science etc.).

The program should assist schools and community organizations in providing oral health educational programs for parents and community members.

### **IV. Referral to and follow up with community dentists for definitive restorative care.**

#### Coordination of Services

Program should coordinate services delivered at the school with those delivered in the community. Student needs can be met more comprehensively when school based programs coordinate and integrate their efforts with existing oral health systems of care in the community.

Coordination of care helps to optimize complementary programs, improve the continuity of care, reduce fragmentation, prevent duplication, and maintain affordable resources.

**V. Quality Assurance program should include a follow up clinical evaluation.**

Effective sealant use

Requires meticulous application technique, particularly moisture control (7, 10).  
Sealant retention should be checked within one year of application (7).

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